

Amendments to the Claims

This listing of claims will replace all prior versions and listings of claims in the application.

Listing of Claims:

1. (currently amended) A method comprising steps of:
 - (a) determining a radial positional offset between a presently active data transducer and a different, target data transducer, with respect to a present data cylinder operably associated with the presently active data transducer, adjacent corresponding data recording surfaces, said offset comprising a distance extending along a radius of said surfaces; and
 - (b) using the determined radial positional offset distance to schedule a seek operation wherein the presently active data transducer is moved from an initial position and the target data transducer is moved to a final position.
2. (previously presented) The method of claim 1, in which the determining step (a) further comprises a step of storing the radial positional offset in a head offset table in memory accessible by a control processor.
3. (previously presented) The method of claim 1, in which the using step (b) comprises steps of identifying an initial seek distance comprising a radial distance between an initial track over which the presently selected data transducer is disposed and a destination cylinder having a destination track to which the target head is to be moved, and determining a corrected seek distance in relation to the initial seek distance and the radial positional offset.
4. (previously presented) The method of claim 1, further comprising a step of:
 - (c) executing a seek to place the target data transducer to the final position adjacent a destination track.
5. (previously presented) The method of claim 4, in which the executing step (c) comprises steps of applying current to an actuator motor to move the presently active data

transducer from an initial cylinder to a final cylinder while transducing servo data from the associated recording surface, and performing a head switch operation to switch to the target data transducer, wherein upon such head switch operation the target data transducer is nominally adjacent the destination track in a destination cylinder different from the final cylinder.

6. (previously presented) The method of claim 4, in which the executing step (c) comprises steps of performing a head switch operation to switch from the presently active data transducer to the target data transducer, and applying current to an actuator motor to move the target data transducer to the destination track in a destination cylinder while using the target data transducer to transducer servo data from the associated recording surface.

7. – 11. (canceled)

12. (currently amended) A data storage device, comprising:

a plurality of heads adjacent a corresponding plurality of recording surfaces on
which a plurality of concentric data tracks are respectively defined so that
the tracks on the recording surfaces at each given radius make up a cylinder;
and

means for scheduling a plurality of pending access commands from a host computer
to access a corresponding plurality of destination tracks on different
recording surfaces each having an associated target head different from a
presently active head, by determining a corrected seek time for each of the
pending access commands which accounts for radial positional offset
distance between the presently active head and the associated target head,
with respect to a present data cylinder operably associated with the presently
active head, along the respective recording surfaces.

13. (previously presented) The data storage device of claim 12, wherein the means
for scheduling comprises a control processor which schedules the execution of the pending
access commands in relation to the corrected seek time for each pending access command

determined in relation to an estimated seek length as a radial distance between an initial cylinder over which the presently active head is located and a destination cylinder having a destination track corresponding to the associated access command, a radial positional offset value between the presently active head and the associated target head, and a table of estimated seek times by seek length.

14. (canceled)

15. (currently amended) A data storage device comprising a control circuit which schedules a seek operation wherein a presently active data transducer is moved from an initial position adjacent a first media surface and a target data transducer is moved to a final position adjacent a second media surface, said scheduling based on a corrected seek time determined in relation to a radial positional offset distance between the presently active data transducer and the target data transducer, with respect to a present data cylinder operably associated with the presently active data transducer, as measured along a radius of said first and second media surfaces.

16. (previously presented) The data storage device of claim 15, wherein the control circuit determines the corrected seek time by identifying an initial seek distance along the radius of the first media surface between an initial cylinder comprising the initial position and a destination cylinder comprising the final position, and then determining a corrected seek distance in relation to the initial seek distance and the radial positional offset distance.

17. (previously presented) The data storage device of claim 15, wherein the control circuit further executes the seek operation to place the target data transducer at the final position adjacent a destination track in a destination cylinder.

18. (previously presented) The data storage device of claim 17, wherein the control circuit executes the seek by applying current to an actuator motor to move the presently active data transducer from an initial cylinder to a final cylinder while transducing servo data from the associated recording surface, and performing a head switch operation to

switch to the target data transducer, wherein upon such head switch operation the target data transducer is nominally adjacent the destination track.

19. (previously presented) The data storage device of claim 17, wherein the control circuit executes the seek by performing a head switch operation to switch from the presently active data transducer to the target data transducer, and applying current to an actuator motor to move the target data transducer to the destination track while using the target data transducer to transducer servo data from the associated recording surface.

20. (currently amended) A method comprising:

determining a radial offset distance between a first data transducer adjacent a first data storage cylinder and a second data transducer, with respect to the first data storage cylinder, said distance extending between the transducers along a radius of the first data storage cylinder; and

using the determined radial offset distance to schedule a seek operation from a plurality of operations for moving the second data transducer to a second data storage cylinder different than the first data storage cylinder.

21. (previously presented) The method of claim 20, wherein the using step comprises determining an estimated seek distance comprising a radial distance between the first cylinder comprising an initial track and the second cylinder comprising a destination track, and then adjusting the estimated seek distance in relation to the radial offset distance to obtain a corrected seek distance representative of the actual distance between the second head and the destination track.

22. (previously presented) The method of claim 21, wherein the using step further comprises determining a seek time from a seek profile table in relation to the corrected seek distance.

23. (previously presented) The method of claim 21, wherein the using step further comprises rounding the corrected seek distance to a whole number of tracks.

24. (previously presented) The method of claim 20, further comprising executing said seek operation in a queued command environment.